

**WHAT IS CLAIMED IS:**

1. A tympanic thermometer comprising:

a heat sensing probe defining a longitudinal axis and an outer surface extending from a distal end of the tympanic thermometer;

5 an ejection apparatus including at least one finger extending from the distal end of the tympanic thermometer and being configured for movement along the outer surface of the probe; and

a probe cover being mountable to the distal end of the tympanic thermometer, the probe cover defining an inner surface configured to engage the outer  
10 surface of the probe, the probe cover including at least one longitudinal rib radially projecting from the inner surface thereof, the longitudinal rib defining a proximal face to facilitate ejection of the probe cover,

wherein the at least one finger is configured to engage the proximal face.

2. A tympanic thermometer as recited in claim 1, wherein the outer surface of the  
15 probe defines a groove, transversely oriented relative to the longitudinal axis, which is configured to receive a portion of the probe cover for releasably retaining the probe cover with the probe.

3. A tympanic thermometer as recited in claim 2, wherein the portion of the probe  
20 cover includes a plurality of protuberances projecting from the inner surface of the probe cover and being proximally spaced from the distal end of the probe cover.

4. A tympanic thermometer as recited in claim 1, wherein the ejection apparatus includes a plurality of fingers.

5. A tympanic thermometer as recited in claim 1, wherein the at least one finger includes a tapered finger tip defining a distal strike face.

25 6. A tympanic thermometer as recited in claim 1, wherein the at least one finger is movable between a retracted position and an extended position.

7. A tympanic thermometer as recited in claim 6, whereby the at least one finger is biased to the extended position.

8. A tympanic thermometer as recited in claim 1, whereby the at least one finger is  
30 releasably fixable in a retracted position.

9. A tympanic thermometer as recited in claim 8, wherein the at least one finger is releasably fixable via a latch, whereby the latch includes a release button that is engageable to release the at least one finger from the retracted position.

5 10. A probe cover as recited in claim 1, wherein the probe cover includes a plurality of longitudinal ribs.

11. A tympanic thermometer as recited in claim 1, wherein the at least one longitudinal rib has a transverse face having a substantially parallel orientation relative to the longitudinal axis of the probe.

10 12. A tympanic thermometer as recited in claim 1, wherein the ejection apparatus includes equidistantly spaced fingers, each having a tapered finger tip that defines a distal strike face and the probe cover including equidistantly spaced longitudinal ribs, each having a proximal strike face, wherein the distal strike faces and proximal strike faces engage for moving the fingers between a retracted position and an extended position.

15 13. A tympanic thermometer comprising:

a heat sensing probe defining a longitudinal axis and an outer surface extending from a distal end of the tympanic thermometer, the probe defining a transverse groove in the outer surface;

20 an ejection apparatus including at least one finger extending from the distal end of the tympanic thermometer and being configured for movement along the outer surface of the probe, the at least one finger being disposed for movement proximal to the transverse groove; and

25 a probe cover having an inner surface being releasably mountable to the outer surface of the probe, the probe cover including at least one longitudinal rib projecting from the inner surface of the probe cover, the at least one longitudinal rib defining a proximal face configured for engagement with the at least one finger;

wherein the proximal face and the at least one finger engage for moving the at least one finger between a retracted position and an extended position.

30 14. A tympanic thermometer as recited in claim 13, wherein the transverse groove is disposed circumferentially about the outer surface of the probe and substantially perpendicular to the longitudinal axis of the probe.

15. A tympanic thermometer as recited in claim 13, wherein the at least one finger includes a tapered finger tip defining a distal strike face.

16. A tympanic thermometer as recited in claim 15, wherein the distal strike face is configured for engagement with the proximal face of the at least one longitudinal rib.

17. A tympanic thermometer as recited in claim 13, wherein the at least one finger is biased to the extended position.

18. A tympanic thermometer as recited in claim 13, wherein the at least one finger is releasably fixed in the retracted position.

19. A tympanic thermometer as recited in claim 18, wherein the at least one finger is releasably fixable via a latch, the latch including a release button being engageable to release the at least one finger from the retracted position.

20. A tympanic thermometer comprising:

a cylindrical heat sensing probe extending from a distal end of the tympanic thermometer and defining a longitudinal axis, the probe defining a circumferential groove in an outer surface thereof;

an ejection apparatus extending from the distal end of the tympanic thermometer and including a plurality of fingers disposed about the outer surface of the probe, the fingers being movable between a retracted position and an extended position whereby the fingers are biased to the extended position and releasably fixable in the retracted position via a latch, the latch including a release button that is engageable to release the fingers from the retracted position, the fingers defining a tapered finger tip that includes a distal strike face; and

a probe cover being releasably mountable to the probe, the probe cover including a plurality of protuberances projecting from an inner circumferential surface thereof and being proximally spaced from a distal end of the probe cover, the protuberances being receivable within the groove for releasably retaining the probe cover with the probe, the probe cover further including a plurality of longitudinal ribs radially extending from an inner circumferential surface of the probe cover, the longitudinal ribs defining a proximal strike face configured to engage the distal strike face of the fingers,

wherein the distal strike face and the proximal strike face engage for moving the fingers between the retracted position and the extended position.